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IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re patent application of:	)	
	)	Before the Examiner
Patrick Egan	)	
	)	Nguyen, Chi Q.
Serial No.: 09/633,937	)	
	)	Group Art Unit 3637
Filed: August 8, 2000	)	
	)	Our Ref.: 20181-2
PRE-FABRICATED WALL PANELING	)	

**DECLARATION OF PATRICK EGAN**

I, Patrick Egan, hereby swear and affirm as follows:

1. I am the inventor of the above application. I am also the President and owner of Thermocore Panel Systems ("Thermocore"), the seller of the invention covered by the claims in the present application. Our web site is <~~www.thermocore.com~~ *www.thermocore.com*>

**COMMERCIAL SUCCESS**

2. The invention has been very commercially successful. Set forth below is a photograph of merely one example of a custom home built with the present invention:



The commercial success of the invention has been caused by the combination of features claimed as the invention. In particular, Thermocore sells a prefabricated wall panel covered by the claims of the present invention having an overall panel thickness of four inches (hereafter the "Four Inch Panel"). Thermocore also sells an otherwise identical product that is not covered by the claims which has an overall panel thickness of 4 ½ inches ("the 4 ½ inch panel"). As explained further below, the Four Inch Panel invention has been overtaking the 4 ½ inch panel in terms of commercial sales. Specifically, overall sales for Thermocore have increased approximately 26 percent in 2001 and thereafter increased again approximately 29 percent in 2002. Nearly all of that growth has been from increasing sales of the Four-Inch Panel invention. Conversely, the sales volume of the 4 ½ inch panel, not covered by the patent claims, has been generally stagnant or on the decline since the introduction of the invention.

3. Thermocore's business is generally divided into two divisions, our "Structural" products and our "Timber Frame" products. The claimed invention (the Four Inch Panel) as well as the 4

that the present invention can achieve, notwithstanding the non-conventional reduction in thickness, makes the inventive Four Inch Panel an appealing product.

6. Customers now call Thermocore to get the Four Inch Panel which has allowed us to sell in markets that we could not compete prior to the launch of the inventive Four Inch Panel. Moreover, presently we are backlogged with orders for the invention since the commercial demand exceeds our present ability to meet that demand.
7. Ordinary building with panels will cost a little more than if one were to stick build the exterior walls and roof and house. However, when you convert the cost difference on a typical 2,200 sq./ft. house the difference in cost may add \$10.00 to your monthly mortgage payment. But when you look at how the panels will impact your monthly utility bills, we have found that a home of this size will see a reduction of approximately \$80-120 per month in their energy costs.

#### INDUSTRY RECOGNITION

8. The present invention has received industry recognition, being featured in several trade publications, namely:

- Building Systems Magazine, October 1999 (Exhibit A);
- Building Components, November 1999 (Exhibit B);
- Building Dimensions, November 1999 (Exhibit C); and,
- Professional Builder, January 2000 (Exhibit D).

#### THE PORTER PANELS

9. I have reviewed the two U.S. patents to William H. Porter (Patent No. 5,771,645 and Patent No. 5,497,589). Mr. Porter's company, W. H. Porter, Inc., sells his product commercially as "Porter Structural Insulated Panels" as illustrated on that company's web site

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>. Portions of that web site are attached as Exhibit E of this

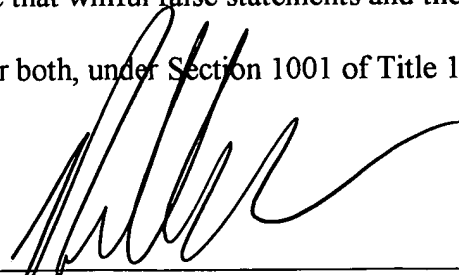
Declaration. Notably, as set forth, the panel thickness are conventional thickness of "4 ½ inch" and "6 ½ inch" and greater. Specifically, this overall panel thickness is dictated by the conventional use of a conventional "2 x 4" having actual dimensions of approximately 1.5" by 3.5". When this conventional 2 x 4 is used in connection with 7/16 inch oriented strand board, set forth in the Porter web page, the resulting panel thickness is the conventional 4 ½ inch. Moreover, the Porter panels utilize expanded polystyrene (EPS), indicated on the web site as only having an R value of 3.85 per inch thickness at 75 degrees Fahrenheit. As such, as set forth in the second page of Exhibit E, even the thicker 4 ½ inch Porter panel only has an R value of 15.8. Porter's conventional thinking, as opposed to the present invention, does not utilize the overall panel thickness of the present invention which allows the convenience of cost savings of avoiding furring of window and door jams. Moreover, the R-value of the Porter product is less than the preferred insulation of the present invention, even though the Porter product is actually thicker. Thus, the Porter product does not enjoy the advantages of the Thermocore panel in reducing the cost of furring window and door jams, reducing bulk for shipment and storage (by virtue of being a thinner panel), while having improved insulation characteristics.

10. I hereby declare that all statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United

States Code.

2/11/03

Date

  
Patrick Egan